SPECIFICATION F-160. WOVEN WIRE FENCE

DESCRIPTION

160–1.1 This Work covers the requirements for furnishing materials and constructing new wire fences with wood posts and gates in accordance with these Specifications and as shown on the Plans. Erect the fence with two-stranded barbed wire, as indicated on the Plans.

MATERIALS

160–2.1 WIRE.

a. Woven Wire (Zinc–coated). Use a woven wire fence that is 7–bar, 26–inch (0.66 m) field fence with top and bottom wires No. 10 ASW gauge, and filler and stay wires No. 12-1/2 ASW gauge. Stay wires shall be spaced 6 inches (150 mm) apart. All wires shall be smooth galvanized steel wire, conforming to Fed. Spec. RR–F–221, Type B. All wires shall be two–dip and spaced as shown on the Plans.

b. Barbed Wire (Zinc–coated). Use a zinc–coated barbed wire that is 2–strand twisted No. 12-1/2 ASW gauge galvanized steel wire with 4–point barbs of No. 14 ASW gauge galvanized steel wire. All wire shall conform to Fed. Spec. RR–F–221, Type A. The barbs shall be spaced approximately 4 inches (100 mm) apart.

c. Barbed Wire (Copper–covered). Copper–covered steel barbed wire shall conform to Fed. Spec. RR–F–221, Type A.

d. Barbed Wire (Aluminum–coated). Aluminum–coated steel–barbed wire shall be 2–strand twisted No. 12-1/2 ASW gauge. The 4–point barbs of No. 14 ASW gauge aluminum–coated steel wire shall be spaced approximately 5 inches (125 mm) apart. The steel wire shall have a tensile strength of between 60,000 and 80,000 pounds per square inch (413,700 and 551,600 kPa), and the aluminum coating shall have a minimum weight of 0.30 ounce per square foot (0.10 kg/square meter) of wire surface on the No. 12-1/2 ASW gauge line wires and 0.25 ounce per square foot (0.08 kg/square meter) of wire surface on the No. 14 ASW gauge barbs.

e. Bracing Wire (Zinc–coated). Use No. 9 smooth galvanized soft wire when using cable for bracing.

160–2.2 GATES AND HARDWARE. Construct gates of galvanized steel tubing conforming to Fed. Spec. RR–F–191 and use the size shown on the Plans. Furnish heavily galvanized hinges and latches with each gate. Use either a bolt or lag screw hinge, and furnish either a wing or butterfly latch.

160–2.3 POSTS.

a. Species. Use one of the following species of wood for all posts, unless otherwise shown on the Plans.

Northern White Cedar
Southern Yellow Pine
Tamarack
Red (Norway) Pine
Jack Pine

Posts shall be given a preservative treatment in accordance with the method specified as full length treatment.

b. Quality. Posts should be peeled, sound, straight–grained, free from decay, cracks, and splits; shakes must not be in excess of 1/4 inch (6 mm) wide and 3 feet (0.9 m) long. Checks (lengthwise separations of the wood in a generally radial direction) are permitted, provided they are not injurious.

c. Dimensions. Posts shall be of the length shown on the Plans. Posts shall have the diameter shown on the Plans or minimum top diameters not less than 4–1/2 inches (115 mm) for line posts and not less than 6 inches (150 mm) for corner, bracer, or vertical angle posts. Sawed and split posts are acceptable instead of round posts provided their dimensions are such that round posts of required diameter could be turned therefrom.

d. Manufacture. Outer bark should be completely removed from all posts including depressions. Inner bark should be removed from all post surfaces to be treated, except inner bark may remain in depressions. The amount of wood shaved off in the removal of inner bark should be held to a minimum.

e. Full Length Treatment. Condition posts by air seasoning, steaming, or heating in oil in a manner that prevents injurious checking, splitting, or warping before treating. The treatment, care, and preservative shall be in accordance with Fed. Spec. TT–W–571.

160–2.4 BRACES. Use cleats, gate stops, and braces in the sizes shown on the Plans. Use the same species and quality specified for the posts or approved by the Engineer that are free from knots larger than one–third the width of the piece. Make gate stops of posts of suitable length. Braces may be made of posts of suitable length or of sawed lumber. Treat all cleats, gate stops, and any braces in contact with the ground and for a distance of at least 6 inches (150 mm) above the ground as specified herein for posts. The wire used in cable for bracing shall conform to Subsection 160–2.1e.

160–2.5 STAPLES. Use staples that are No. 9 galvanized steel wire, 1 inch (25 mm) long for hardwood posts and 1–1/2 inches (37 mm) long for use in softwood posts.

CONSTRUCTION METHODS

160–3.1 GENERAL. Construct the fence in accordance with the details on the Plans and as specified herein using new materials. Prior to the beginning of the Work or upon the request of the Contractor, the Engineer will locate the position of the Work by establishing and marking the property line or fence line. When directed, span the opening below the fence with barbed wire fastened to posts of extra length at locations of small natural or drainage ditches where it is not practical to conform the fence to the general contour of the ground surface. Permanently tie the new fence to the terminals of existing fences whenever required by the Engineer. Plumb the finished fence taut, true to line and ground contour, and complete in every detail. When directed, stake down the woven wire fence at several points between posts.

Arrange construction of the new fence to keep livestock on adjoining property enclosed at all times. Do not exceed 300 feet (90 m) or any length of unfenced section at any time that the stock can be kept in the proper field. At the close of the working day, tie the newly constructed fence to the unremoved existing fence. Guard openings in the fence when livestock is using the adjoining property.

160–3.2 CLEARING FENCE LINE. Clear the site of the fence of obstructions, and grade surface irregularities so that the fence will conform to the general contour of the ground. Clear the fence line to a minimum width of 2 feet (0.60 m) on each side of the centerline of the fence. This clearing consists of the removal of all stumps, brush, rocks, trees, or other obstructions that will interfere with proper construction of the fence. Grub and excavate stumps within the cleared area of the fence line. Place the bottom of the fence a uniform distance above ground as specified in the Plans. When shown on the Plans or as directed by the Engineer, remove as part of the construction Work, the existing fences which coincide with, or are in a position to interfere with, the new fence location unless the removal is listed as a separate item in the Schedule of Prices. After post and stump removal refill remaining holes with suitable soil, gravel, or other material acceptable to the Engineer and compact these areas properly with tampers.

The Work shall include the handling and disposal of all material cleared, of excess excavation, and the removal of spoiled material regardless of the type, character, composition, or condition of such material encountered.

160–3.3 SETTING POSTS. Set posts with large ends down, plumb, and in good line on the side on which the wire is to be fastened. Set posts full depth and do not cut posts off to eliminate rock or other excavation. Remove rock where it is encountered, even if blasting is necessary, to provide full–depth and full–size holes. Cut off square the bottoms of all posts. The diameter of the holes must be at least 6 inches (150 mm) larger than the diameter of the posts. When cleats are used on posts, dig the holes large enough to accommodate them. After posts are placed and lined, backfill the holes with suitable material and properly compacted by the use of tampers. Set and brace with braces and wire the posts adjacent to end, corner, anchor, and gate posts as shown on the Plans. No extra compensation shall be made for rock excavation. Rock excavation may not be grounds for extension of time.

160–3.4 ANCHORING. Anchor corner, end, gate, and adjacent intermediate posts by gaining and spiking cleats to the sides of the posts, as indicated on the Plans. No cleats will be required on other intermediate posts or on anchor posts.

160–3.5 BRACING. Brace end, corner, anchor, and gate posts by using a post of sufficient length or a piece of sawed lumber of the proper size, together with a wire cable. Gain and securely spike the wooden brace into the end, corner, anchor, or gate posts and into the next intermediate posts about 6 inches (150 mm) from the top of the respective posts. Loop a cable made of a double strand of galvanized soft wire around the end, corner, anchor, or gate post near the ground and around the next intermediate post about 12 inches (300 mm) from the top. After the cable has been stapled in this position, twist it until tight. The staples used to hold the cable shall be not less than 1–1/2 inches (37 mm) long. Leave the tool used for twisting the cable in place to permit later adjustment of bracing if found necessary. Set anchor posts at approximately 500–foot (150 m) intervals and braced to the adjacent posts. Brace posts before the wire fencing is placed.

160–3.6 INSTALLING WIRE. Place the wires on the side of the posts away from the Airport or as directed. Place the wire fence on the posts at the height indicated on the Plans. Install longitudinal wires parallel and draw them uniformly taut. The vertical stay wires of the woven wire fencing should be straight and vertical. Wrap the woven wire once around the post and wrap barbed wire at the end and gate posts. Staple each longitudinal wire at least three times and tie these wire ends with a snug, tight twist. Staple each longitudinal wire to each intermediate post with one steel wire staple. At the corner and anchor posts, use two or more staples. Staple the top barbed wire strand of all fences with two staples in each post. Set diagonally with the grain of the wood and drive up tight all staples. After the fence has been erected, saw off the tops of the wood posts with a 1–to–3 pitch. The bottom wire of the wire fencing must clear the ground by not more than 4 inches (100 mm) or less than 1 inch (25 mm) at all locations.

160–3.7 SPLICING WIRE. Wire splices in longitudinal wires will be permitted if made with an approved galvanized bolt–clamp splice or a wire splice made as follows:

a. Carry the end of the wires 3 inches (75 mm) past the splice tool and wrap around the other wire away from the tool for at least six turns in opposite directions.

b. After the tool is removed, close the space occupied by it by pulling the ends together.

c. Cut close the unused ends of the wires.

d. Splice woven wire only at posts.

160–3.8 INSTALLING GATES. Hang the gates on gate fittings, as shown on the Plans. Clamp, screw or bolt fittings on the gate posts to prevent slipping. Erect gates to swing in the direction indicated and provide gate stops, as specified or as shown on the Plans. Erect gates at locations shown on the Plans.

160–3.9 EXISTING FENCE CONNECTIONS. Wherever the new fence joins an existing fence, either at a corner or at the intersection of straight fence lines, set a corner or anchor post at the junction, braced and anchored the same as herein described for corner posts.

If the connection is made at other than the corner of the new fence, the last span of the old fence should contain a brace span.

160–3.10 CLEANING UP. Remove all tools, buildings, equipment, debris, and excess material used during construction.

160-3.11 ELECTRICAL GROUNDS. Construct electrical grounds where a power line passes over the fence and at 500–foot (150 m) intervals. Install the ground directly below the point of crossing. Accomplish the ground with a copperclad rod 8 feet (2.4 m) long and a minimum of 5/8 inch (15 mm) in diameter driven vertically until the top is 6 inches (150 mm) below the ground surface. Clamp a No. 6 solid copper conductor to the rod and to the fence so that each element of the fence is grounded. Installation of ground rods shall not constitute a separate Pay Item and shall be considered incidental to fence construction.

NOTE TO SPECIFIER:
Use of this Pay Item will require a detail to be included in the Plans.

METHOD OF MEASUREMENT

160–4.1 Woven Wire Fence will be measured in place from outside to outside of end posts or corner posts and will be the length of fence actually constructed, except for the space occupied by the gates.

Gates will be measured in units for each gate installed and accepted.

BASIS OF PAYMENT

160–5.1 Payment will be made at the Contract unit price per linear foot for Woven Wire Fence. This price will be full compensation for furnishing all materials and for preparation, erection, and installation of these materials, and for all labor, equipment, tools and incidentals necessary to complete the Work.

Payment will be made at the Contract unit price per each for gates. This price will be full compensation for furnishing all materials and for all preparation, erection, and installation of these materials and for all labor, equipment, tools, and incidentals to complete the Work.

Standard Pay Items for Work covered by this Specification are as follows:

Pay Item F16001	Woven Wire Fence, per linear foot
Pay Item F16002	Entrance Gate, 4 foot, per each
Pay Item F16003	Entrance Gate, 6 foot, per each
Pay Item F16004	Entrance Gate, 8 foot, per each
Pay Item F16005	Entrance Gate, 10 foot, per each
Pay Item F16006	Entrance Gate, 12 foot, per each
Pay Item F16007	Entrance Gate, 14 foot, per each
Pay Item F16008	Entrance Gate, 16 foot, per each

Measurement and Payment will only be made for Pay Items included in the Schedule of Prices. The cost of all Work required by the Contract Documents shall be included in the Pay Items contained in the Schedule of Prices.

MATERIAL REQUIREMENTS

Fed.Spec.RR–F–191/Gen.	Fencing, Wire and Post, Metal (and Gates, Chain–Link Fence Fabric, and Accessories)
Fed.Spec. RR–F–221	Fencing, Wire, Fence Post and Accessories (Barbed Wire, Woven Wire and Netting)
Fed.Spec. TT–W–571	Wood Preservation: Testing Practices

SPECIFICATION F–162. CHAIN LINK FENCES

DESCRIPTION

162–1.1 This Work consists of furnishing and erecting a chain link fence in accordance with these Specifications and the details shown on the Plans and in conformity with the lines and grades shown on the Plans or established by the Engineer. Chain Link Fence, of the type and height specified, shall consist of fencing fabric, attached to metal posts, including bracing, terminal posts, corner posts and bracing, tension wire or rails, electrical grounding, concrete, hardware, barbed wire (when specified), clearing, site preparation, and appurtenances. Types of Chain Link Fence are defined as follows:

NOTE TO SPECIFIER:
The Wisconsin DOT Highways Standard Detail is a Type 2 Chain Link Fence. If other types are included in the Schedule of Prices, additional details need to be included on the Plans.

a. Type 1: Chain Link Fence with tension wire top and bottom, driven line posts, and barbed wire.

b. Type 2: Chain Link Fence with tension wire top and bottom, and driven line posts.

c. Type 3: Chain Link Fence with tension wire top and bottom, concrete anchored line posts and barbed wire.

d. Type 4: Chain Link Fence with tension wire top and bottom, and concrete anchored line posts.

e. Type 5: Chain Link Fence with top and bottom rails, concrete anchored line posts, and barbed wire.

f. Type 6: Chain Link Fence with top and bottom rails, and concrete anchored line posts.

Anchor corner posts, anchor posts, terminal posts, gate posts, and other brace posts indicated on the Plans in concrete for all types of Chain Link Fence.

MATERIALS

162–2.1 FABRIC. The fabric shall be woven from a 9 gauge aluminum–coated steel wire in a 2–inch (50 mm) mesh and shall conform to the requirements of ASTM A 491.

NOTE TO SPECIFIER:
The following are allowed by FAA.
Galvanized steel fabric shall conform to the requirements of ASTM A 392, Class 2.
Aluminum alloy fabric shall conform to the requirements of ASTM F 1183.
Polyvinyl chloride–coated steel shall conform to the requirements of ASTM F 668, Class 2b.
Zinc – 5% aluminum mischmetal alloy coated steel shall conform to the requirements of ASTM F 1345, Class 2.
Metallic coated fabric shall have a clear acrylic coating applied to the selvage area after weaving.
The fabric specified in the Standard Specification is consistent with DOT Highways. Other fabric in the list may be added by Special Provision upon approval by the WBOA. Zinc coated fabric is not allowed due to potential problems from salt spray.

162–2.2 BARBED WIRE. Barbed wire shall be 2–strand 12–1/2 gauge **zinc–coated or aluminum–coated** wire with 4–point barbs and shall conform to the requirements of ASTM A 121, Class 3, Chain Link Fence Grade, or ASTM A 585, Class II.

162–2.3 POSTS, RAILS AND BRACES. Posts, rails, and braces furnished for use in conjunction with aluminum–coated steel fabric shall be of zinc–coated steel.

Line posts, rails, and braces shall be galvanized steel pipe structural shapes or roll formed conforming to the requirements of the following:

a. Galvanized steel pipe shall conform to the requirements of ASTM F 1083.

b. The steel used in all structural shapes shall conform to the requirements of ASTM A 572, Grade 45, and shall be galvanized in accordance with the requirements of ASTM F 1234, Type A.

c. Roll–formed sections shall be fabricated from material meeting the requirements of ASTM A 570, Grade 45, and shall be galvanized in accordance with the requirements of ASTM F 1234, Type A, or coated with zinc–5 percent aluminum mischmetal alloy in accordance with ASTM F 1234, Type C.

Posts, rails, and braces shall demonstrate the ability to withstand testing in salt spray in accordance with ASTM B 117 as follows:

Exterior: 1,000 hours with a maximum of 5 percent red rust.
Interior: 650 hours with a maximum of 5 percent red rust.

The dimensions of the posts, rails, and braces shall be in accordance with Tables I through VI of Fed. Spec. RR–F–191/3.

162–2.4 GATES. Gate frames shall consist of galvanized steel pipe and conform to the specifications for the same material under Paragraph 162–2.3. The fabric should consist of the same type material as used in the fence.

162–2.5 WIRE TIES AND TENSION WIRES. Wire ties, for use in conjunction with a given type of fabric, shall be of the same material and coating weight identified with the fabric type. Tension wire shall be 7–gauge marcelled steel wire with the same coating as the fabric type and shall conform to ASTM A 824.

All material shall conform to Fed. Spec. RR–F–191/4.

162–2.6 MISCELLANEOUS FITTINGS AND HARDWARE. Miscellaneous steel fittings and hardware for use with aluminum–coated steel fabric shall be of commercial grade steel or better quality, wrought or cast as appropriate to the article, and sufficient in strength to provide a balanced design when used in conjunction with fabric posts, and wires of the quality specified herein. All steel fittings and hardware shall be protected with a zinc coating applied in conformance with ASTM A 153. Barbed wire support arms shall withstand a load of 250 pounds (113 kg) applied vertically to the outermost end of the arm.

162–2.7 CONCRETE. Use a commercial grade Portland cement concrete with a minimum 28–day compressive strength of 2,500 psi (17,240 kPa).

162–2.8 MARKING. Each roll of fabric must carry a tag showing the kind of base metal, kind of coating, the gage of the wire, the length of fencing in the roll, and the name of the manufacturer. Identify posts, wire, and other fittings as to manufacturer, kind of base metal, and kind of coating.

CONSTRUCTION METHODS

162–3.1 CLEARING FENCE LINE. Clear the site of the fence of obstructions, and grade surface irregularities to allow the fence to conform to the general contour of the ground. Clear the fence line to a minimum width of 2 feet (600 mm) on each side of the centerline of the fence. This clearing consists of the removal of all stumps, brush, rocks, trees, or other obstructions that will interfere with proper construction of the fence. When shown on the Plans or as directed by the Engineer, remove (as part of the Work) existing fences that coincide with, or are in a position to interfere with the new fence location, unless such removal is listed as a separate Pay Item in the Schedule of Prices. Refill holes remaining after post and stump removal with suitable soil, gravel, or other material acceptable to the Engineer and compact it properly with tampers.

Work shall include the handling and disposal of all material cleared, excavated or removed, regardless of the type, character, composition, or condition of such material encountered.

162–3.2 INSTALLING POSTS. Set all posts in concrete, (line posts may be driven) when specified, at the required dimension, depth, and spacing shown on the Plans.

NOTE TO SPECIFIER:
Posts should be spaced not more than 10 feet (3 m) apart and should be set a minimum of 36 inches (0.9 m) in concrete footings, unless they are driven, in which case the WisDOT Standard detail shows a depth of 32 inches. If the frost depth is greater than the footing depth or driven depth shown on the Plans, the posts should be set accordingly.

Thoroughly compact the concrete around the posts by tamping or vibrating, leave a smooth finish slightly higher than the ground, and slope it to drain away from the posts. Set all posts plumb and to the required grade and alignment. Do not install materials on the posts or disturb the posts in any manner within 7 days after the individual concrete post footing is completed. Drive line posts plumb to the minimum depth required on the Plans. Drive or set posts with their tops at an elevation to provide a smooth profile at the top wire without abrupt changes and that will conform to the ground contour.

If rock is encountered at a depth less than the planned footing depth, drill to a depth of 12 inches (300 mm) a hole 2 inches (50 mm) larger than the greatest dimension of the posts. After the posts are set, fill the remainder of the drilled hole with grout, composed of one part portland cement and two parts mortar sand. Fill the remaining space above the rock with concrete in the manner described above.

Instead of drilling, the rock may be excavated to the required footing depth. No extra compensation will be made for rock excavation.

162–3.3 INSTALLING TOP RAILS. The top rail must be continuous and shall pass through the post tops. The coupling used to join the top rail lengths shall allow for expansion.

162–3.4 INSTALLING BRACES. Install horizontal brace rails, with diagonal truss rods and turnbuckles, at all terminal posts.

162–3.5 INSTALLING FABRIC. Firmly attach the wire fabric to the posts and brace it in the manner shown on the Plans. Stretch all wire taut and install it to the required elevations. The fence shall follow the contour of the ground, with the bottom of the fence fabric no less than 1 inch (25 mm) or more than 4 inches (100 mm) from the ground surface. Perform grading where necessary to provide a uniform and smooth surface contour.

At locations of small natural swales or drainage ditches and where it is not practical to have the fence conform to the general contour of the ground surface, use longer posts and multiple strands of barbed wire stretched thereon to span the opening below the fence. The vertical clearance between strands of barbed wire shall be 6 inches (150 mm) or less.

NOTE TO SPECIFIER:
Openings below the fence may also be spanned with barbed wire fastened to stakes.
The Engineer shall specify if tension wire is to be installed.

162–3.6 ELECTRICAL GROUNDS. Construct electrical grounds where a power line passes over the fence and at 500–foot (150 m) intervals. Install the ground directly below the point of crossing. Accomplish the ground with a copperclad rod 8 feet (2.4 m) long and a minimum of 5/8 inch (15 mm) in diameter driven vertically until the top is 6 inches (150 mm) below the ground surface. Clamp a No. 6 solid copper conductor to the rod and to the fence so that each element of the fence is grounded. Installation of ground rods shall not constitute a separate Pay Item and shall be considered incidental to fence construction.

NOTE TO SPECIFIER:
The Engineer shall indicate the location of all electrical grounds on the plans.

METHOD OF MEASUREMENT

162–4.1 Chain link fence will be measured for payment by the linear foot. Measurement will be along the top of the fence from center to center of end posts, excluding the length occupied by gate openings.

Gates will be measured as complete units, per each.

BASIS OF PAYMENT

162–5.1 Payment for Chain Link Fence will be made at the Contract unit price per linear foot.

Payment for Gates will be made at the Contract unit price for each gate.

The prices will be full compensation for furnishing all materials, and for all preparation, erection, and installation of materials, and for all labor equipment, tools, and incidentals necessary to complete the Work.

Standard Pay Items for Work covered by this Specification are as follows:

Pay Item F16201	Chain Link Fence, Type 1, 6 foot, per linear foot
Pay Item F16202	Chain Link Fence, Type 1, 7 foot, per linear foot
Pay Item F16203	Chain Link Fence, Type 1, 8 foot, per linear foot
Pay Item F16204	Chain Link Fence, Type 1, 10 foot, per linear foot
Pay Item F16205	Chain Link Fence, Type 1, 12 foot, per linear foot
Pay Item F16206	Chain Link Fence, Type 2, 6 foot, per linear foot
Pay Item F16207	Chain Link Fence, Type 2, 7 foot, per linear foot
Pay Item F16208	Chain Link Fence, Type 2, 8 foot, per linear foot
Pay Item F16209	Chain Link Fence, Type 2, 10 foot, per linear foot
Pay Item F16210	Chain Link Fence, Type 2, 12 foot, per linear foot
Pay Item F16211	Chain Link Fence, Type 3, 6 foot, per linear foot
Pay Item F16212	Chain Link Fence, Type 3, 7 foot, per linear foot

Pay Item F16213	Chain Link Fence, Type 3, 8 foot, per linear foot
Pay Item F16214	Chain Link Fence, Type 3, 10 foot, per linear foot
Pay Item F16215	Chain Link Fence, Type 3, 12 foot, per linear foot
Pay Item F16216	Chain Link Fence, Type 4, 6 foot, per linear foot
Pay Item F16217	Chain Link Fence, Type 4, 7 foot, per linear foot
Pay Item F16218	Chain Link Fence, Type 4, 8 foot, per linear foot
Pay Item F16219	Chain Link Fence, Type 4, 10 foot, per linear foot
Pay Item F16220	Chain Link Fence, Type 4, 12 foot, per linear foot
Pay Item F16221	Chain Link Fence, Type 5, 6 foot, per linear foot
Pay Item F16222	Chain Link Fence, Type 5, 7 foot, per linear foot
Pay Item F16223	Chain Link Fence, Type 5, 8 foot, per linear foot
Pay Item F16224	Chain Link Fence, Type 5, 10 foot, per linear foot
Pay Item F16225	Chain Link Fence, Type 5, 12 foot, per linear foot
Pay Item F16226	Chain Link Fence, Type 6, 4 foot, per linear foot
Pay Item F16227	Chain Link Fence, Type 6, 5 foot, per linear foot
Pay Item F16228	Chain Link Fence, Type 6, 6 foot, per linear foot
Pay Item F16229	Chain Link Fence, Type 6, 7 foot, per linear foot
Pay Item F16230	Chain Link Fence, Type 6, 8 foot, per linear foot
Pay Item F16231	Chain Link Fence, Type 6, 10 foot, per linear foot
Pay Item F16232	Chain Link Fence, Type 6, 12 foot, per linear foot
Pay Item F16240 through F16260	Chain Link Fence Gate, ___ foot height, ___ foot width, per each
Pay Item F16261 through F16280	Chain Link Fence Gate, Location ___, per lump sum

Measurement and Payment will only be made for Pay Items contained in the Schedule of Prices. The cost of all Work required by the Contract Documents shall be included in the Pay Items contained in the Schedule of Prices.

MATERIAL REQUIREMENTS

ASTM A 121	Zinc–Coated (Galvanized) Steel Barbed Wire
ASTM A 123	Zinc (Hot Galvanized) Coatings on Products Fabricated from Rolled, Pressed, and Forged Steel Shapes, Plates, Bars, and Strip
ASTM A 153	Zinc Coating (Hot–Dip) on Iron and Steel Hardware
ASTM A 446	Specification for Steel Sheet, Zinc–Coated (Galvanized) by the Hot–Dip Process, Structural (Physical) Quality
ASTM A 491	Aluminum–Coated Steel Chain–Link Fence Fabric
ASTM A 569	Steel, Carbon (0.15 Maximum, Percent), Hot Rolled Sheet and Strip Commercial Quality
ASTM A 570	Hot–Rolled Carbon Steel Sheet and Strip Structural Quality
ASTM A 572	High–Strength Low–Alloy Columbium–Vanadium Steels of Structural Quality
ASTM A 585	Aluminum–Coated Steel Barbed Wire
ASTM A 824	Metallic–Coated Steel Marcelled Tension Wire for Use With Chain Link Fence
ASTM B 117	Standard Test Method of Salt Spray (Fog) Testing
ASTM B 221	Aluminum–Alloy Extruded Bars, Rods, Wire Shapes and Tubes
ASTM F 1083	Pipe, Steel, Hot–dipped Zinc–coated (galvanized) Welded, for Fence Structures
ASTM F 1234	Protective Coatings on Steel Framework for Fences
Fed. Spec. RR–F– 191/3	Fencing, Wire and Post, Metal (Chain Link Fence Posts, Top Rails and Braces)
Fed. Spec. RR–F–191/4	Fencing, Wire and Post, Metal (Chain Link Fence Accessories)